Claim Listing

1-24. (canceled)

25. (previously presented) A compound or a pharmaceutically acceptable salt form, stereoisomer, or tautomer thereof, wherein:

the compound corresponds in structure to formula (Vb):

$$\begin{array}{c|c}
R^4 & N \\
N & S \\
N & N \\
N$$

 R^1 is selected from the group consisting of hydrogen, alkenyl, alkoxyalkyl, alkoxycarbonylalkyl, alkyl, alkylcarbonylalkyl, alkylsulfanylalkyl, alkylsulfanylalkyl, alkylsulfonylalkyl, alkylsulfonylalkyl, alkynyl, aryl, arylalkenyl, arylsulfanylalkyl, arylsulfonylalkyl, carboxyalkyl, cyanoalkyl, cycloalkenyl, cycloalkyl, arylsulfonylalkyl, carboxyalkyl, cyanoalkyl, cycloalkenyl, cycloalkyl, cycloalkyl, cycloalkyl, formylalkyl, haloalkoxyalkyl, haloalkoxyalkyl, haloalkyl, heteroarylalkenyl, heteroarylalkyl, heteroarylsulfonylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkyl, nitroalkyl, R_aR_bN- , $R_aR_bNalkyl-$, $R_aR_bNC(O)$ alkyl-, $R_aR_bNC(O)$ Oalkyl-, $R_aR_bNC(O)$ Oalkyl-, $R_fR_gC=N-$, and R_kO- , wherein R^1 is substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(ORc), -(alkyl)(NRcRe), -SRc, -S(O)Rc, -S(O)2Rc, -ORc, -N(Rc)(Re), -C(O)Rc, -C(O)ORc, and -C(O)NRcRe;

 R^4 is selected from the group consisting of alkoxy, arylalkoxy, aryloxy, halo, hydroxy, $R_aR_bN_{-}$, N_3 -, and R_eS_{-} , wherein R^4 is substituted with 0, 1, or 2 substituents independently selected from the group consisting of halo, nitro, cyano, -OH, -NH₂, and -COOH;

 R^5 is selected from the group consisting of $R_aSO_2N(R_f)$ -, $R_aSO_2N(R_f)$ alkyl-, $R_aR_bNSO_2N(R_f)$ -, and $R_aR_bNSO_2N(R_f)$ alkyl-;

 R^6 is independently selected at each occurrence from the group consisting of alkyl, alkenyl, alkynyl, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, heterocyclealkyl, -(alkyl)(OR_k), -(alkyl)(NR_aR_b), - SR_a , - $S(O)R_a$, - $S(O)_2R_a$, - OR_k , - $N(R_a)(R_b)$, - $C(O)R_a$, - $C(O)OR_a$, and - $C(O)NR_aR_b$, wherein each R^6 is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, haloalkyl, cyano,

nitro, -OR_a, -NR_aR_b, -SR_a, -SOR_a, -SO₂R_a, -C(O)OR_a, -C(O)NR_aR_b, and -NC(O)R_a;

 R_a and R_b , at each occurrence, are independently selected from the group consisting of hydrogen, alkenyl, alkylsulfanylalkyl, aryl, arylalkenyl, arylalkyl, cyanoalkyl, cycloalkenyl, cycloalkenyl, cycloalkylalkyl, cycloalkylalkyl, haloalkyl, heteroaryl, heteroarylalkenyl, heteroarylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkylcarbonyl, nitroalkyl, R_cR_dN -, R_cR_dN alkyl-, R_cR_dN C(O)alkyl-, R_cSO_2 -, R_cSO_2 alkyl-, $R_cC(O)$ -, $R_cC(O)$ alkyl-, $R_cOC(O)$ -, $R_cOC(O)$ alkyl-, R_cR_dN C(O)-, R_cR_dN C(O)-, R_cR_dN C(O)Oalkyl-, and R_cR_dN C(O)N(R_c)alkyl-, wherein R_a and R_b are substituted with 0, 1, or 2 substituents selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(O R_c), -(alkyl)(N R_cR_d), -S R_c , -S(O) R_c , -S(O) R_c , -O R_c , -N(R_c)(R_d), -C(O) R_c , -C(O)O R_c , and -C(O)N R_cR_d ;

alternatively, R_a and R_b, together with the nitrogen atom to which they are attached, form a three-to six-membered ring selected from the group consisting of heteroaryl and heterocycle, wherein the heteroaryl and heterocycle are independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_c), -(alkyl)(NR_cR_d), -alkylSO₂NR_cR_d, -alkylC(O)NR_cR_d, -SR_c, -S(O)R_c, -S(O)₂R_c, -OR_c, -N(R_c)(R_d), -C(O)R_c, -C(O)OR_c, and -C(O)NR_cR_d;

 R_c and R_d , at each occurrence, are independently selected from the group consisting of hydrogen, -NR_fR_h, -OR_f, -CO(R_f), -SR_f, -SOR_f, -SO₂R_f, -C(O)NR_fR_h, -SO₂NR_fR_h, -C(O)OR_f, alkenyl, alkyl, alkynyl, cycloalkyl, cycloalkyl, cycloalkenyl, cycloalkenylalkyl, aryl, arylalkyl, haloalkyl, heteroaryl, heteroarylalkyl, heterocycle, and heterocycloalkyl, wherein each R_c and R_d is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_f), -(alkyl)(NR_fR_h), -SR_f, -S(O)R_f, -S(O)₂R_f, -OR_f, -N(R_f)(R_h), -C(O)R_f, -C(O)OR_f, -C(O)NR_fR_h, -C(O)N(H)NR_fR_h, -N(R_c)C(O)OR_f, -N(R_c)SO₂NR_fR_h, -N(R_c)C(O)NR_fR_h, -N(R_c)C(O)NR_fR_h, -N(R_c)C(O)NR_fR_h, and -alkylN(R_c)C(O)NR_fR_h;

alternatively, R_c and R_d , together with the nitrogen atom to which they are attached, form a three-to six-membered ring selected from the group consisting of heteroaryl and heterocycle, wherein the heteroaryl and heterocycle are independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_f), -(alkyl)(NR_fR_h), -SR_f, -S(O)₂R_f, -OR_f, -N(R_f)(R_h), -C(O)R_f, -C(O)OR_f, and -C(O)NR_fR_h;

Re is selected from the group consisting of hydrogen, alkenyl, alkyl, and cycloalkyl;

 R_f , R_g , and R_h , at each occurrence, are independently selected from the group consisting of hydrogen, alkyl, alkenyl, arylalkyl, cycloalkyl, cycloalkylalkyl, cycloalkenyl, cycloalkenyl, cycloalkenylalkyl, heterocycle, heterocyclealkyl, heteroarylalkyl, and heteroarylalkyl, wherein each R_f , R_g , and R_h is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, cyano, halo, oxo, nitro, aryl, arylalkyl, cycloalkyl, cycloalkenyl, heterocycle, heteroaryl, heteroarylalkyl, -OH, -O(alkyl), -N(H)(alkyl), -N(alkyl)_2, -S(alkyl), -S(O)(alkyl), -SO₂alkyl, -alkyl-OH, -alkyl-O-alkyl, -alkylNH₂, -alkylN(H)(alkyl), -alkylN(alkyl)₂, -alkylS(alkyl), -alkylS(O)(alkyl), -alkylSO₂alkyl, -N(H)C(O)NH₂, -C(O)OH, -C(O)O(alkyl), -C(O)alkyl, -C(O)NH₂, -C(O)N(H)(alkyl), and -C(O)N(alkyl)₂;

alternatively, R_f and R_g, together with the carbon atom to which they are attached, form a threeto seven-membered ring selected from the group consisting of cycloalkyl, cycloalkenyl, and heterocycle;

alternatively, R_f and R_h, together with the nitrogen atom to which they are attached form a three-to seven-membered ring selected from the group consisting of heterocycle and heteroaryl, wherein each of the heterocycle and heteroaryl is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, cyano, halo, oxo, nitro, aryl, arylalkyl, cycloalkyl, cycloalkenyl, heterocycle, heteroaryl, heteroarylalkyl, -OH, -O(alkyl), -NH₂, -N(H)(alkyl), -N(alkyl)₂, -S(alkyl), -S(alkyl), -S(O)(alkyl), -alkyl-OH, -alkyl-O-alkyl, -alkylN(H)(alkyl), -alkylS(O)(alkyl), -alkylSO₂alkyl, -alkylN(alkyl)₂, -N(H)C(O)NH₂, -C(O)OH, -C(O)O(alkyl), -C(O)NH₂, -C(O)NH₂, -C(O)N(H)(alkyl), and -C(O)N(alkyl)₂;

 R_k is selected from the group consisting of hydrogen, alkenyl, alkyl, aryl, arylalkyl, cyanoalkyl, cycloalkenyl, cycloalkyl, cycloalkylalkyl, formylalkyl, haloalkyl, heteroaryl, heteroarylalkyl, heterocycle, heterocyclealkyl, nitroalkyl, $R_aR_bNalkyl$ -, $R_aOalkyl$ -, $R_aR_bNC(O)$ -, $R_aR_bNC(O)$ -, $R_aR_bNC(O)$ -, R_aSO_2 -, R_aSo_3

m is 0, 1, 2, 3, or 4.

26. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 25, wherein R⁴ is hydroxy.

- 27. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 26, wherein R^1 is selected from the group consisting of hydrogen, alkenyl, alkoxyalkyl, alkoxycarbonylalkyl, alkyl, alkynyl, arylalkenyl, arylalkyl, carboxyalkyl, cyanoalkyl, cycloalkenyl, cycloalkenylalkyl, cycloalkyl, cycloalkylalkenyl, cycloalkylalkyl, formylalkyl, haloalkyl, heteroarylalkenyl, heteroarylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkyl, R_aR_bN -, R_aR_bN alkyl-, $R_aR_bNC(O)$ alkyl-, R_cR_gC =N-, and R_kO -.
- 28. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 25, wherein the compound is selected from the group consisting of:
- N-{[3-(1-benzyl-4-hydroxy-2-oxo-1,2-dihydroquinolin-3-yl)-1,1-dioxido-4H-thieno[2,3-e][1,2,4] thiadiazin-7-yl]methyl}methanesulfonamide;
- N-[(3-{1-[(cyclopropylmethyl)amino]-4-hydroxy-2-oxo-1,2-dihydroquinolin-3-yl}-1,1-dioxido-4H-thieno[2,3-e][1,2,4]thiadiazin-7-yl)methyl]methanesulfonamide;
- N-[(3-{1-[(cyclopropylmethyl)amino]-4-hydroxy-2-oxo-1,2-dihydroquinolin-3-yl}-1,1-dioxido-4H-thieno[2,3-e][1,2,4]thiadiazin-7-yl)methyl]ethanesulfonamide;
- N-[(3-{1-[(cyclopropylmethyl)amino]-4-hydroxy-2-oxo-1,2-dihydroquinolin-3-yl}-1,1-dioxido-4H-thieno[2,3-e][1,2,4]thiadiazin-7-yl)methyl]propane-1-sulfonamide;
- $N-[(3-\{1-[(cyclopropylmethyl)amino]-4-hydroxy-2-oxo-1,2-dihydroquinolin-3-yl\}-1,1-dioxido-4H-thieno[2,3-e][1,2,4]thiadiazin-7-yl)methyl]propane-2-sulfonamide;$
- $N-[(3-\{1-[(cyclopropylmethyl)amino]-4-hydroxy-2-oxo-1,2-dihydroquinolin-3-yl\}-1,1-dioxido-4H-thieno[2,3-e][1,2,4]thiadiazin-7-yl)methyl]benzenesulfonamide; and$
- $N-[(3-\{1-[(cyclopropylmethyl)amino]-4-hydroxy-2-oxo-1,2-dihydroquinolin-3-yl\}-1,1-dioxido-4H-thieno[2,3-e][1,2,4]thiadiazin-7-yl)methyl]-1-phenylmethanesulfonamide.$

29. (canceled)

30. (previously presented) A compound or a pharmaceutically acceptable salt form, stereoisomer, or tautomer thereof, wherein:

the compound corresponds in structure to formula (Vla):

R¹ is selected from the group consisting of hydrogen, alkenyl, alkoxyalkyl, alkoxycarbonylalkyl, alkyl, alkylsulfanylalkyl, alkylsulfanylalkyl, alkylsulfonylalkyl, alkylsulfonylalkyl, aryl, arylalkenyl, arylsulfanylalkyl, arylsulfonylalkyl, carboxyalkyl, cyanoalkyl, cycloalkenyl, cycloalkenyl, cycloalkyl)alkenyl, (cycloalkyl)alkyl, formylalkyl, haloalkoxyalkyl, haloalkoxyalkyl, haloalkyl, heteroarylalkenyl, heteroarylalkyl, heteroarylsulfonylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkyl, nitroalkyl, RaRbN-, RaRbNalkyl-, RaRbNC(O)alkyl-, RaRbNC(O)Oalkyl-, RaRbNC(O)NRcalkyl-, RfRgC=N-, and RkO-, wherein R¹ is substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(ORc), -(alkyl)(NRcRe), -SRc, -S(O)Rc, -S(O)2Rc, -ORc, -N(Rc)(Re), -C(O)Rc, -C(O)ORc, and -C(O)NRcRe;

R⁴ is selected from the group consisting of alkoxy, arylatkoxy, aryloxy, halo, hydroxy, R_aR_bN-, N₃-, and R_eS-, wherein R⁴ is substituted with 0, 1, or 2 substituents independently selected from the group consisting of halo, nitro, cyano, -OH, -NH₂, and -COOH;

 R^5 is selected from the group consisting of $R_aSO_2N(R_f)$ -, $R_aSO_2N(R_f)$ alkyl-, $R_aR_bNSO_2N(R_f)$ -, and $R_aR_bNSO_2N(R_f)$ alkyl-;

 R^6 is independently selected at each occurrence from the group consisting of alkyl, alkenyl, alkynyl, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, heterocyclealkyl, -(alkyl)(OR_k), -(alkyl)(NR_aR_b), -SR_a, -S(O)R_a, -S(O)₂R_a, -OR_k, -N(R_a)(R_b), -C(O)R_a, -C(O)OR_a, and -C(O)NR_aR_b, wherein each R⁶ is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, haloalkyl, cyano, nitro, -OR_a, -NR_aR_b, -SR_a, -SOR_a, -SO₂R_a, -C(O)OR_a, -C(O)NR_aR_b, and -NC(O)R_a;

R_a and R_b, at each occurrence, are independently selected from the group consisting of hydrogen, alkenyl, alkylsulfanylalkyl, aryl, arylalkenyl, arylalkyl, cyanoalkyl, cycloalkenyl,

cycloalkenylalkyl, cycloalkyl, cycloalkylalkyl, cycloalkylalkenyl, formylalkyl, haloalkyl, heteroaryl, heteroarylalkenyl, heteroarylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkylcarbonyl, nitroalkyl, $R_cR_dN_c$, $R_cR_dN_c$,

alternatively, R_a and R_b, together with the nitrogen atom to which they are attached, form a three-to six-membered ring selected from the group consisting of heteroaryl and heterocycle, wherein the heteroaryl and heterocycle are independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_c), -(alkyl)(NR_cR_d), -alkylSO₂NR_cR_d, -alkylC(O)NR_cR_d, -SR_c, -S(O)R_c, -S(O)₂R_c, -OR_c, -N(R_c)(R_d), -C(O)R_c, -C(O)OR_c, and -C(O)NR_cR_d;

 R_c and R_d , at each occurrence, are independently selected from the group consisting of hydrogen, -NR_fR_h, -OR_f, -CO(R_f), -SR_f, -SOR_f, -SO₂R_f, -C(O)NR_fR_h, -SO₂NR_fR_h, -C(O)OR_f, alkenyl, alkyl, alkynyl, cycloalkyl, cycloalkylalkyl, cycloalkenyl, cycloalkenylalkyl, aryl, arylalkyl, haloalkyl, heteroaryl, heteroarylalkyl, heterocycle, and heterocycloalkyl, wherein each R_c and R_d is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_f), -(alkyl)(NR_fR_h), -SR_f, -S(O)R_f, -S(O)₂R_f, -OR_f, -N(R_f)(R_h), -C(O)R_f, -C(O)OR_f, -C(O)NR_fR_h, -C(O)N(H)NR_fR_h, -N(R_c)C(O)OR_f, -N(R_c)SO₂NR_fR_h, -N(R_c)C(O)NR_fR_h, -N(R_c)C(O)NR_fR_h, -alkylN(R_c)C(O)NR_fR_h;

alternatively, R_c and R_d , together with the nitrogen atom to which they are attached, form a three-to six-membered ring selected from the group consisting of heteroaryl and heterocycle, wherein the heteroaryl and heterocycle are independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_f), -(alkyl)(NR_fR_h), -SR_f, -S(O)R_f, -S(O)₂R_f, -OR_f, -N(R_f)(R_h), -C(O)OR_f, and -C(O)NR_fR_h;

R_e is selected from the group consisting of hydrogen, alkenyl, alkyl, and cycloalkyl;

R_f, R_g, and R_h, at each occurrence, are independently selected from the group consisting of hydrogen, alkyl, alkenyl, arylalkyl, cycloalkyl, cycloalkyl, cycloalkyl, cycloalkenyl, cycloalkyl, cycloalkyl, cycloalkenyl, cyc

heterocycle, heterocyclealkyl, heteroaryl, and heteroarylalkyl, wherein each R_f , R_g , and R_h is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, cyano, halo, oxo, nitro, aryl, arylalkyl, cycloalkyl, cycloalkenyl, heterocycle, heteroaryl, heteroarylalkyl, -OH, -O(alkyl), -N(alkyl), -N(alkyl), -N(alkyl), -S(O)(alkyl), $-SO_2alkyl$, -alkyl-OH, -alkyl-O-alkyl, $-alkylNH_2$, -alkylN(H)(alkyl), $-alkylN(alkyl)_2$, -alkylS(alkyl), -alkylS(O)(alkyl), $-alkylSO_2alkyl$, $-N(H)C(O)NH_2$, -C(O)OH, -C(O)O(alkyl), -C(O)alkyl, $-C(O)NH_2$, -C(O)N(H)(alkyl), and $-C(O)N(alkyl)_2$;

alternatively, R_f and R_g, together with the carbon atom to which they are attached, form a threeto seven-membered ring selected from the group consisting of cycloalkyl, cycloalkenyl, and heterocycle;

alternatively, R_f and R_h, together with the nitrogen atom to which they are attached, form a three-to seven-membered ring selected from the group consisting of heterocycle and heteroaryl, wherein each of the heterocycle and heteroaryl is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, cyano, halo, oxo, nitro, aryl, arylalkyl, cycloalkyl, cycloalkenyl, heterocycle, heteroaryl, heteroarylalkyl, -OH, -O(alkyl), -N(H)(alkyl), -N(alkyl), -S(alkyl), -S(alkyl), -S(O)(alkyl), -alkyl-OH, -alkyl-O-alkyl, -alkylNH₂, -alkylN(H)(alkyl), -alkylS(alkyl), -alkylS(O)(alkyl), -alkylSO₂alkyl, -alkylN(alkyl)₂, -N(H)C(O)NH₂, -C(O)OH, -C(O)O(alkyl), -C(O)NH₂, -C(O)NH₂, -C(O)N(H)(alkyl), and -C(O)N(alkyl)₂;

 R_k is selected from the group consisting of hydrogen, alkenyl, alkyl, aryl, arylalkyl, cyanoalkyl, cycloalkenyl, cycloalkyl, cycloalkylalkyl, formylalkyl, haloalkyl, heteroaryl, heteroarylalkyl, heterocycle, heterocyclealkyl, nitroalkyl, $R_aR_bNalkyl$ -, $R_aOalkyl$ -, $R_aR_bNC(O)$ -, $R_aR_bNC(O)$ -, $R_aR_bNC(O)$ -, R_aSO_2 -, R_aSol_2

m is 0, 1, 2, 3, or 4.

- 31. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 30, wherein R^4 is hydroxy.
- 32. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 31, wherein R¹ is selected from the group consisting of hydrogen, alkenyl, alkoxyalkyl, alkoxyarbonylalkyl, alkyl, alkynyl, arylalkenyl, arylalkyl, carboxyalkyl, cyanoalkyl, cycloalkenyl, cycloalkenylalkyl, cycloalkyl,

cycloalkylalkenyl, cycloalkylalkyl, formylalkyl, haloalkyl, heteroarylalkenyl, heteroarylalkyl, heteroarylalkyl, heterocyclealkyl, hydroxyalkyl, R_aR_bN -, R_aR_bN alkyl-, $R_aR_bNC(O)$ alkyl-, R_dR_aC =N-, and R_kO -.

33. (previously presented) A compound or a pharmaceutically acceptable salt form, stereoisomer, or tautomer thereof, wherein:

the compound corresponds in structure to formula (Vlb):

$$\begin{array}{c|c}
R^4 & N \\
N & N \\
N & N \\
N & O \\
N & N \\
N & O \\
N$$

R¹ is selected from the group consisting of hydrogen, alkenyl, alkoxyalkyl, alkoxycarbonylalkyl, alkyl, alkylsulfanylalkyl, alkylsulfanylalkyl, alkylsulfanylalkyl, alkylsulfanylalkyl, alkylsulfanylalkyl, alkylsulfanylalkyl, alkylsulfanylalkyl, arylsulfanylalkyl, carboxyalkyl, cyanoalkyl, cycloalkenyl, cycloalkyl, cycloalkyl, cycloalkyl, cycloalkyl, cycloalkyl, formylalkyl, haloalkoxyalkyl, haloalkyl, heteroarylalkenyl, heteroarylalkyl, heteroarylsulfonylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkyl, nitroalkyl, RaRbN-, RaRbNalkyl-, RaRbNC(O)alkyl-, RaRbNC(O)Oalkyl-, RaRbNC(O)NRcalkyl-, RfRgC=N-, and RkO-, wherein R¹ is substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(ORc), -(alkyl)(NRcRe), -SRc, -S(O)Rc, -S(O)2Rc, -ORc, -N(Rc)(Re), -C(O)Rc, -C(O)ORc, and -C(O)NRcRc;

 R^4 is selected from the group consisting of alkoxy, arylalkoxy, aryloxy, halo, hydroxy, R_aR_bN -, N_3 -, and R_eS -, wherein R^4 is substituted with 0, 1, or 2 substituents independently selected from the group consisting of halo, nitro, cyano, -OH, -NH₂, and -COOH;

 R^5 is selected from the group consisting of $R_aSO_2N(R_f)$ -, $R_aSO_2N(R_f)$ alkyl-, $R_aR_bNSO_2N(R_f)$ -, and $R_aR_bNSO_2N(R_f)$ alkyl-;

 R^6 is independently selected at each occurrence from the group consisting of alkyl, alkenyl, alkynyl, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, heterocyclealkyl, -(alkyl)(OR_k), -(alkyl)(NR_aR_b), -SR_a, -S(O)R_a, -S(O)₂R_a, -OR_k, -N(R_a)(R_b), -C(O)R_a, -C(O)OR_a, and -C(O)NR_aR_b, wherein each R⁶ is independently substituted with 0, 1, 2, or 3 substituents

independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, haloalkyl, cyano, nitro, -OR_a, -NR_aR_b, -SO_a, -SO₂R_a, -C(O)OR_a, -C(O)NR_aR_b, and -NC(O)R_a;

 R_a and R_b , at each occurrence, are independently selected from the group consisting of hydrogen, alkenyl, alkyl, alkylsulfanylalkyl, aryl, arylalkenyl, arylalkyl, cyanoalkyl, cycloalkenyl, cycloalkenyl, cycloalkylalkyl, cycloalkylalkenyl, formylalkyl, haloalkyl, heteroaryl, heteroarylalkenyl, heteroarylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkylcarbonyl, nitroalkyl, R_cR_dN -, R_cR_dN alkyl-, R_cR_dN C(O)alkyl-, R_cSO_2 -, R_cSO_2 alkyl-, $R_cC(O)$ -, $R_cC(O)$ alkyl-, $R_cC(O)$ -, $R_cC(O)$ -, $R_cC(O)$ -, $R_cC(O)$ -, $R_cC(O)$ -, R_cR_dN C(O)-, R_cR_dN C(O)-, R_cR_dN C(O)-, R_cR_dN C(O)-, R_cR_dN C(O)-, R_cR_dN C(O)-, R_cR_dN C(O)-, and R_cR_dN C(O)N(R_c)alkyl-, wherein R_a and R_b are substituted with 0, 1, or 2 substituents selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_c), -(alkyl)(NR_cR_d), -SR_c, -S(O)R_c, -S(O)_2R_c, -OR_c, -N(R_c)(R_d), -C(O)R_c, -C(O)OR_c, and -C(O)NR_cR_d;

alternatively, R_a and R_b , together with the nitrogen atom to which they are attached, form a three-to six-membered ring selected from the group consisting of heteroaryl and heterocycle, wherein the heteroaryl and heterocycle are independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_c), -(alkyl)(NR_cR_d), -alkylSO₂NR_cR_d, -alkylC(O)NR_cR_d, -SR_c, -S(O)R_c, -S(O)₂R_c, -OR_c, -N(R_c)(R_d), -C(O)R_c, -C(O)OR_c, and -C(O)NR_cR_d;

 R_c and R_d , at each occurrence, are independently selected from the group consisting of hydrogen, -NR_fR_h, -OR_f, -CO(R_f), -SR_f, -SO₂R_f, -C(O)NR_fR_h, -SO₂NR_fR_h, -C(O)OR_f, alkenyl, alkyl, alkynyl, cycloalkyl, cycloalkylalkyl, cycloalkenyl, cycloalkenylalkyl, aryl, arylalkyl, haloalkyl, heteroaryl, heteroarylalkyl, heterocycle, and heterocycloalkyl, wherein each R_c and R_d is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_f), -(alkyl)(NR_fR_h), -SR_f, -S(O)R_f, -S(O)₂R_f, -OR_f, -N(R_f)(R_h), -C(O)R_f, -C(O)OR_f, -C(O)NR_fR_h, -C(O)N(H)NR_fR_h, -N(R_e)C(O)OR_f, -N(R_e)SO₂NR_fR_h, -N(R_e)C(O)NR_fR_h, -alkylN(R_e)C(O)NR_fR_h;

alternatively, R_c and R_d, together with the nitrogen atom to which they are attached, form a three-to six-membered ring selected from the group consisting of heteroaryl and heterocycle, wherein the heteroaryl and heterocycle are independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_t),

-(alkyl)(NR_fR_h), -SR_f, -S(O)R_f, -S(O)₂R_f, -OR_f, -N(R_f)(R_h), -C(O)R_f, -C(O)OR_f, and -C(O)NR_fR_h; R_e is selected from the group consisting of hydrogen, alkenyl, alkyl, and cycloalkyl;

 R_f , R_g , and R_h , at each occurrence, are independently selected from the group consisting of hydrogen, alkyl, alkenyl, arylalkyl, cycloalkyl, cycloalkylalkyl, cycloalkenyl, cycloalkenyl, cycloalkenylalkyl, heterocycle, heterocyclealkyl, heteroaryl, and heteroarylalkyl, wherein each R_f , R_g , and R_h is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, cyano, halo, oxo, nitro, aryl, arylalkyl, cycloalkyl, cycloalkenyl, heterocycle, heteroaryl, heteroarylalkyl, -OH, -O(alkyl), -N(H)(alkyl), $-N(alkyl)_2$, -S(alkyl), -S(O)(alkyl), $-SO_2alkyl$, -alkyl-OH, -alkyl-O-alkyl, $-alkylNH_2$, -alkylN(H)(alkyl), $-alkylN(alkyl)_2$, -alkylS(alkyl), -alkylS(O)(alkyl), $-alkylSO_2alkyl$, $-N(H)C(O)NH_2$, -C(O)OH, -C(O)O(alkyl), -C(O)Alkyl, $-C(O)NH_2$, -C(O)N(H)(alkyl), and $-C(O)N(alkyl)_2$;

alternatively, R_f and R_g, together with the carbon atom to which they are attached, form a threeto seven-membered ring selected from the group consisting of cycloalkyl, cycloalkenyl, and heterocycle;

alternatively, R_f and R_h, together with the nitrogen atom to which they are attached, form a three-to seven-membered ring selected from the group consisting of heterocycle and heteroaryl, wherein each of the heterocycle and heteroaryl is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, cyano, halo, oxo, nitro, aryl, arylalkyl, cycloalkyl, cycloalkenyl, heterocycle, heteroaryl, heteroarylalkyl, -OH, -O(alkyl), -NH₂, -N(H)(alkyl), -N(alkyl)₂, -S(alkyl), -S(alkyl), -S(O)(alkyl), -alkyl-OH, -alkyl-O-alkyl, -alkylNH₂, -alkylN(H)(alkyl), -alkylS(alkyl), -alkylS(O)(alkyl), -alkylSO₂alkyl, -alkylN(alkyl)₂, -N(H)C(O)NH₂, -C(O)OH, -C(O)O(alkyl), -C(O)NH₂, -C(O)NH₂, -C(O)N(H)(alkyl), and -C(O)N(alkyl)₂;

 R_k is selected from the group consisting of hydrogen, alkenyl, alkyl, aryl, arylalkyl, cyanoalkyl, cycloalkenyl, cycloalkyl, cycloalkyl, formylalkyl, haloalkyl, heteroaryl, heteroarylalkyl, heterocycle, heterocyclealkyl, nitroalkyl, $R_aR_bNalkyl$ -, $R_aOalkyl$ -, $R_aR_bNC(O)$ -, $R_aR_bNC(O)$ -, $R_aR_bNC(O)$ -, R_aSO_2 -, R_aSol_2 -, R

m is 0, 1, 2, 3, or 4.

34. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 33, wherein R⁴ is hydroxy.

35. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 34, wherein R^1 is selected from the group consisting of hydrogen, alkenyl, alkoxyalkyl, alkoxycarbonylalkyl, alkyl, alkynyl, arylalkenyl, arylalkyl, carboxyalkyl, cyanoalkyl, cycloalkenyl, cycloalkenylalkyl, cycloalkyl, cycloalkylalkyl, formylalkyl, haloalkyl, heteroarylalkenyl, heteroarylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkyl, R_aR_bN -, R_aR_bN alkyl-, $R_aR_bNC(O)$ alkyl-, $R_dR_gC=N$ -, and R_kO -.

36-51. (canceled)

52. (previously presented) A compound or a pharmaceutically acceptable salt form, stereoisomer, or tautomer thereof, wherein:

the compound corresponds in structure to formula (VIII):

X is NH, N(alkyl), O, or S;

 R^{1} is selected from the group consisting of hydrogen, alkenyl, alkoxyalkyl, alkoxycarbonylalkyl, alkyl, alkylsulfanylalkyl, alkylsulfanylalkyl, alkylsulfonylalkyl, alkylsulfonylalkyl, aryl, arylalkenyl, arylsulfanylalkyl, arylsulfonylalkyl, carboxyalkyl, cyanoalkyl, cycloalkenyl, cycloalkenyl, cycloalkyl)alkenyl, (cycloalkyl)alkyl, formylalkyl, haloalkoxyalkyl, haloalkyl, heteroarylalkenyl, heteroarylalkyl, heteroarylsulfonylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkyl, nitroalkyl, R_aR_bN -, $R_aR_bNalkyl$ -, $R_aR_bNC(O)$ alkyl-, $R_aR_bNC(O)$ Oalkyl-, $R_aR_bNC(O)$ Oalkyl-, R_fR_gC =N-, and R_kO -, wherein R^1 is substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_c), -(alkyl)(NR_cR_e), -SR_c, -S(O)R_c, -S(O)_2R_c, -OR_c, -N(R_c)(R_e), -C(O)R_c, -C(O)OR_c, and -C(O)NR_cR_e;

R² and R³ are independently selected from the group consisting of hydrogen, alkenyl, alkynyl, alkoxyalkyl, alkoxycarbonyl, alkyl, aryl, arylalkyl, heteroaryl, heterocycle, heteroarylalkyl, cyano, halo,

-N(R_a)(R_b), R_aR_b NC(O)-, -SR_a, -S(O) R_a , -S(O)₂R_a, and R_a C(O)-, wherein R^2 and R^3 are independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of R_a , alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, -(alkyl)(OR_k), -(alkyl)(NR_aR_b), -SR_a, -S(O)R_a, -S(O)₂R_a, -OR_k, -N(R_a)(R_b), -C(O)R_a, -C(O)OR_a, and -C(O)NR_aR_b;

alternatively, R^2 and R^3 , together with the carbon atoms to which they are attached, form a fiveor six-membered ring selected from the group consisting of aryl, cycloalkyl, heteroaryl, and heterocycle, wherein said aryl, cycloalkyl, heteroaryl, and heterocycle is optionally substituted with $(R^6)_m$:

 R^4 is selected from the group consisting of alkoxy, arylalkoxy, aryloxy, halo, hydroxy, $R_aR_bN_7$, N_3 -, and R_eS_7 , wherein R^4 is independently substituted with 0, 1, or 2 substituents independently selected from the group consisting of halo, nitro, cyano, -OH, -NH₂, and -COOH;

 R^5 is independently selected at each occurrence from the group consisting of alkenyl, alkoxy, alkyl, alkynyl, aryl, arylalkyl, arylcarbonyl, aryloxy, azidoalkyl, formyl, halo, haloalkyl, halocarbonyl, heteroaryl, heteroarylalkyl, heterocycle, heterocyclealkyl, hydoxyalkyl, cycloalkyl, cyano, cyanoalkyl, nitro, R_aR_bN -, $R_aC(O)$ -, R_aS -, $R_a(O)S$ -, $R_a(O)_2S$ -, $R_aR_bNalkyl$ -, $R_a(O)SN(R_f)$ -, $R_aSO_2N(R_f)$ -, $R_aSO_2N(R_f)$ -, $R_aC(O)$ -, R_a

 R^6 is independently selected at each occurrence from the group consisting of alkyl, alkenyl, alkynyl, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, heterocyclealkyl, -(alkyl)(OR_k), -(alkyl)(NR_aR_b), - SR_a , - $S(O)R_a$, - $S(O)_2R_a$, - OR_k , - $N(R_a)(R_b)$, - $C(O)R_a$, - $C(O)OR_a$, and - $C(O)NR_aR_b$, wherein each R^6 is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, haloalkyl, cyano, nitro, - OR_a , - NR_aR_b , - SR_a , - SO_2R_a , - $C(O)OR_a$, - $C(O)NR_aR_b$, and - $NC(O)R_a$;

 R^7 is independently selected at each occurrence from the group consisting of alkenyl, alkoxy, alkyl, alkynyl, aryl, arylalkyl, arylcarbonyl, aryloxy, azidoalkyl, formyl, halo, haloalkyl, halocarbonyl, heteroaryl, heteroarylalkyl, heterocycle, heterocyclealkyl, hydoxyalkyl, cycloalkyl, cyano, cyanoalkyl, nitro, R_aR_bN -, $R_aC(O)$ -, R_aS -, $R_a(O)S$ -, $R_a(O)_2S$ -, $R_aR_bNalkyl$ -, $R_a(O)SN(R_f)$ -, $R_aSO_2N(R_f)$ -, $R_aSO_2N(R_f)$ -, $R_aC(O)$ -, $R_aSO_2N(R_f)$ -, $R_aR_bNSO_2N(R_f)$ -, and $R_aR_bNSO_2N(R_f)$ -, and an $R_aR_bNSO_2N(R$

of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_c), -(alkyl)(NR_cR_d), -SR_c, -S(O)₂R_c, -OR_c, -N(R_c)(R_d), -C(O)R_c, -C(O)OR_c, and -C(O)NR_cR_d;

 R_a and R_b , at each occurrence, are independently selected from the group consisting of hydrogen, alkenyl, alkyl, alkylsulfanylalkyl, aryl, arylalkenyl, arylalkyl, cyanoalkyl, cycloalkenyl, cycloalkenyl, cycloalkylalkyl, cycloalkylalkyl, haloalkyl, heteroaryl, heteroarylalkenyl, heteroarylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkylcarbonyl, nitroalkyl, $R_cR_dN^2$, R_cR_d

alternatively, R_a and R_b, together with the nitrogen atom to which they are attached₂ form a three-to six-membered ring selected from the group consisting of heteroaryl and heterocycle, wherein the heteroaryl and heterocycle are independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_c), -(alkyl)(NR_cR_d), -alkylSO₂NR_cR_d, -alkylC(O)NR_cR_d, -SR_c, -S(O)R_c, -S(O)₂R_c, -OR_c, -N(R_c)(R_d), -C(O)R_c, -C(O)OR_c, and -C(O)NR_cR_d;

 R_c and R_d , at each occurrence, are independently selected from the group consisting of hydrogen, -NR_fR_h, -OR_f, -CO(R_f), -SR_f, -SOR_f, -SO₂R_f, -C(O)NR_fR_h, -SO₂NR_fR_h, -C(O)OR_f, alkenyl, alkyl, alkynyl, cycloalkyl, cycloalkylalkyl, cycloalkenyl, cycloalkenylalkyl, aryl, arylalkyl, haloalkyl, heteroaryl, heteroarylalkyl, heterocycle, and heterocyclealkyl; wherein each R_c and R_d is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_f), -(alkyl)(NR_fR_h), -SR_f, -S(O)R_f, -S(O)₂R_f, -OR_f, -N(R_f)(R_h), -C(O)R_f, -C(O)NR_fR_h, -C(O)N(H)NR_fR_h, -N(R_c)C(O)OR_f, -N(R_c)SO₂NR_fR_h, -N(R_c)C(O)NR_fR_h, -N(R_c

alternatively, R_c and R_d, together with the nitrogen atom to which they are attached, form a three-to six-membered ring selected from the group consisting of heteroaryl and heterocycle, wherein the heteroaryl and heterocycle are independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl,

haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_f), -(alkyl)(NR_fR_h), -SR_f, -S(O)R_f, -S(O)₂R_f, -OR_f, -N(R_f)(R_h), -C(O)R_f, -C(O)OR_f, and -C(O)NR_fR_h;

R_e is selected from the group consisting of hydrogen, alkenyl, alkyl, and cycloalkyl;

R_f, R_g, and R_h, at each occurrence, are independently selected from the group consisting of hydrogen, alkyl, alkenyl, arylalkyl, cycloalkyl, cycloalkylalkyl, cycloalkenyl, cycloalkenylalkyl, heterocycle, heterocyclealkyl, heteroaryl, and heteroarylalkyl; wherein each R_f, R_g, and R_h is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, cyano, halo, oxo, nitro, aryl, arylalkyl, cycloalkyl, cycloalkenyl, heterocycle, heteroaryl, heteroarylalkyl, -OH, -O(alkyl), -NH₂, -N(H)(alkyl), -N(alkyl)₂, -S(alkyl), -S(O)(alkyl), -SO₂alkyl, -alkyl-O-alkyl, -alkylNH₂, -alkylN(H)(alkyl), -alkylN(alkyl)₂, -alkylS(alkyl), -alkylS(O)(alkyl), -alkylSO₂alkyl, -N(H)C(O)NH₂, -C(O)OH, -C(O)O(alkyl), -C(O)alkyl, -C(O)NH₂, -C(O)NH₂, -C(O)N(H)(alkyl), and -C(O)N(alkyl)₂;

alternatively, R_f and R_g, together with the carbon atom to which they are attached, form a threeto seven-membered ring selected from the group consisting of cycloalkyl, cycloalkenyl, and heterocycle;

alternatively, R_f and R_h, together with the nitrogen atom to which they are attached, form a three-to seven-membered ring selected from the group consisting of heterocycle and heteroaryl, wherein each of the heterocycle and heteroaryl is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, cyano, halo, oxo, nitro, aryl, arylalkyl, cycloalkyl, cycloalkenyl, heterocycle, heteroaryl, heteroarylalkyl, –OH, -O(alkyl), -NH₂, -N(H)(alkyl), -N(alkyl)₂, -S(alkyl), -S(alkyl), -S(O)(alkyl), -alkyl-OH, -alkyl-O-alkyl, -alkylNH₂, -alkylN(H)(alkyl), -alkylS(alkyl), -alkylS(O)(alkyl), -alkylSO₂alkyl, -alkylN(alkyl)₂, -N(H)C(O)NH₂, -C(O)OH, -C(O)O(alkyl), -C(O)NH₂, -C(O)NH₂, -C(O)N(H)(alkyl), and -C(O)N(alkyl)₃;

 R_k is selected from the group consisting of hydrogen, alkenyl, alkyl, aryl, arylalkyl, cyanoalkyl, cycloalkenyl, cycloalkyl, cycloalkylalkyl, formylalkyl, haloalkyl, heteroaryl, heteroarylalkyl, heterocycle, heterocyclealkyl, nitroalkyl, $R_aR_bNalkyl$ -, $R_aOalkyl$ -, $R_aR_bNC(O)$ -, $R_aR_bNC(O)$ -, $R_aR_bNC(O)$ -, R_aSO_2 -, $R_aSalkyl$ -, $R_a(O)$ Salkyl-, R_aSO_2 alkyl-, $R_aOC(O)$ -, $R_aOC(O)$ -, and $R_aC(O)$ alkyl-, wherein each R_k is substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_c), -(alkyl)(OR_c), -(alkyl)(OR_c), - OR_c , - OR_c ,

m is 0, 1, 2, 3, or 4; and n is 0, 1, or 2.

- 53. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 52, wherein R^2 and R^3 , together with the carbon atoms to which they are attached, form a five- or six-membered ring selected from the group consisting of aryl, cycloalkyl, heteroaryl and heterocycle, wherein said aryl, cycloalkyl, heteroaryl, and heterocycle is optionally substituted with $(R^6)_m$.
- 54. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 53, wherein R² and R³, together with the carbon atoms to which they are attached, form a five- or six-membered ring selected from the group consisting of phenyl, pyridyl, pyridazinyl, pyrimidinyl, pyrazolyl, cyclopentyl, cyclopexyl, and thienyl.
- 55. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 54, wherein R⁴ is hydroxy.
- 56. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 55, wherein the compound is selected from the group consisting of:
- 3-(1,1-dioxido-4H-[1,3]oxazolo[5,4-h][1,2,4]benzothiadiazin-3-yl)-4-hydroxy-1-(isobutylamino) quinolin-2(1H)-one;
- 3-[8-(chloromethyl)-1,1-dioxido-4H-[1,3]oxazolo[5,4-h][1,2,4]benzothiadiazin-3-yl]-4-hydroxy-1-(isobutylamino)quinolin-2(1H)-one;
- 3-{3-[4-hydroxy-1-(isobutylamino)-2-oxo-1,2-dihydroquinolin-3-yl]-1,1-dioxido-4H-[1,3] oxazolo[5,4-h][1,2,4]benzothiadiazin-8-yl}propanoic acid;
- 3-(8-{[(2-aminoethyl)amino]methyl}-1,1-dioxido-4H-[1,3]oxazolo[5,4-h][1,2,4]benzothiadiazin-3-yl)-4-hydroxy-1-(isobutylamino)quinolin-2(1H)-one;
- methyl {3-[4-hydroxy-1-(isobutylamino)-2-oxo-1,2-dihydroquinolin-3-yl]-1,1-dioxido-4H-[1,3] oxazolo[5,4-h][1,2,4]benzothiadiazin-8-yl}acetate;
- 4-hydroxy-3-(8-{[(3R)-3-hydroxypyrrolidin-1-yl]methyl}-1,1-dioxido-4H-[1,3]oxazolo[5,4-h] [1,2,4]benzothiadiazin-3-yl)-1-(isobutylamino)quinolin-2(1H)-one;
- 3-[1,1-dioxido-8-(pyridinium-1-ylmethyl)-4H-[1,3]oxazolo[5,4-h][1,2,4]benzothiadiazin-3-yl]-1-(isobutylamino)-2-oxo-1,2-dihydroquinolin-4-olate;
- 3-[1,1-dioxido-8-(pyrrolidin-1-ylmethyl)-4H-[1,3]oxazolo[5,4-h][1,2,4]benzothiadiazin-3-yl]-4-hydroxy-1-(isobutylamino)quinolin-2(1H)-one;
- 3-[8-(3-aminophenyl)-1,1-dioxido-4H-[1,3]oxazolo[5,4-h][1,2,4]benzothiadiazin-3-yl]-4-hydroxy-1-(isobutylamino)quinolin-2(1H)-one;
 - 3-[8-(aminomethyl)-1,1-dioxido-4H-[1,3]oxazolo[5,4-h][1,2,4]benzothiadiazin-3-yl]-4-hydroxy-

1-(isobutylamino)quinolin-2(1H)-one;

4-hydroxy-3-[8-(hydroxymethyl)-1,1-dioxido-4H-[1,3]oxazolo[5,4-h][1,2,4]benzothiadiazin-3-yl] -1-(isobutylamino)quinolin-2(1H)-one;

3-{8-[(butylamino)methyl]-1,1-dioxido-4H-[1,3]oxazolo[5,4-h][1,2,4]benzothiadiazin-3-yl}-4-hydroxy-1-(isobutylamino)quinolin-2(1H)-one;

3-[9-(butylamino)-1,1-dioxido-4H,8H-[1,4]oxazino[2,3-h][1,2,4]benzothiadiazin-3-yl]-4-hydroxy-1-(isobutylamino)quinolin-2(1H)-one;

4-hydroxy-1-(3-methylbutyl)-3-(8-methyl-1,1-dioxido-4H-[1,3]oxazolo[5,4-h][1,2,4] benzothiadiazin-3-yl)-1,8-naphthyridin-2(1H)-one;

3-[1,1-dioxido-8-(trifluoromethyl)-4,7-dihydroimidazo[4,5-h][1,2,4]benzothiadiazin-3-yl]-4-hydroxy-1-(3-methylbutyl)-1,8-naphthyridin-2(1H)-one;

4-hydroxy-3-(8-hydroxy-1,1-dioxido-4,7-dihydroimidazo[4,5-h][1,2,4]benzothiadiazin-3-yl)-1-(3-methylbutyl)-1,8-naphthyridin-2(1H)-one;

4-hydroxy-1-(3-methylbutyl)-3-(8-methyl-1,1-dioxido-4,7-dihydroimidazo[4,5-h][1,2,4] benzothiadiazin-3-yl)-1,8-naphthyridin-2(1H)-one;

3-[1,1-dioxido-8-(pentafluoroethyl)-4,7-dihydroimidazo[4,5-h][1,2,4]benzothiadiazin-3-yl]-4-hydroxy-1-(3-methylbutyl)-1,8-naphthyridin-2(1H)-one;

3-[8-(chloromethyl)-1,1-dioxido-4,7-dihydroimidazo[4,5-h][1,2,4]benzothiadiazin-3-yl]-4-hydroxy-1-(3-methylbutyl)-1,8-naphthyridin-2(1H)-one;

{3-[4-hydroxy-1-(3-methylbutyl)-2-oxo-1,2-dihydro-1,8-naphthyridin-3-yl]-1,1-dioxido-4,7-dihydroimidazo[4,5-h][1,2,4]benzothiadiazin-8-yl}acetonitrile;

methyl {3-[4-hydroxy-1-(3-methylbutyl)-2-oxo-1,2-dihydro-1,8-naphthyridin-3-yl]-1,1-dioxido-4,7-dihydroimidazo[4,5-h][1,2,4]benzothiadiazin-8-yl}acetate;

 $3-(9,9-\text{dioxido}-6H-[1,2,5]\text{thiadiazolo}[3,4-h][1,2,4]\text{benzothiadiazin-7-yl}-4-\text{hydroxy-1-(3-methylbutyl}-1,8-naphthyridin-2(1H)-one;}$

3-(8-amino-1,1-dioxido-4,7-dihydroimidazo[4,5-h][1,2,4]benzothiadiazin-3-yl)-4-hydroxy-1-(3-methylbutyl)-1,8-naphthyridin-2(1H)-one; and

4-hydroxy-3-[8-(hydroxymethyl)-1,1-dioxido-4,9-dihydroimidazo[4,5-h][1,2,4]benzothiadiazin-3-yl]-1-(3-methylbutyl)-1,8-naphthyridin-2(1H)-one.

57. (previously presented) A compound or a pharmaceutically acceptable salt form, stereoisomer, or tautomer thereof, wherein the compound is selected from the group consisting of:

 $N-\{3-[1-(cyclobutylamino)-4-hydroxy-2-oxo-1,2-dihydroquinolin-3-yl]-1,1-dioxido-4<math>H$ -1,2,4-benzothiadiazin-7-yl}methanesulfonamide;

- N-[(3-{1-[(cyclopropylmethyl)amino]-4-hydroxy-2-oxo-1,2-dihydroquinolin-3-yl}-1,1-dioxido-4H-thieno[2,3-e][1,2,4]thiadiazin-7-yl)methyl]methanesulfonamide;
- *N*-(3-{1-[(cyclopropylmethyl)amino]-4-hydroxy-2-oxo-1,2-dihydro-3-quinolinyl}-1,1-dioxido-4*H*-1,2,4-benzothiadiazin-7-yl)methanesulfonamide;
- N-{3-[1-(cyclobutylamino)-4-hydroxy-2-oxo-1,2-dihydro-3-quinolinyl]-1,1-dioxido-4H-1,2,4-benzothiadiazin-7-yl}sulfamide; and
- N-{3-[1-(cyclobutylamino)-4-hydroxy-2-oxo-1,2-dihydro-3-quinolinyl]-1,1-dioxido-4H-1,2,4-benzothiadiazin-7-yl}-N-methylsulfamide.

58-61. (canceled)

- 62. (previously presented) A pharmaceutical composition comprising a therapeutically effective amount of one or more compounds, salts, stereoisomers, or tautomers recited in claim 57 and a pharmaceutically acceptable carrier.
- 63. (previously presented) The pharmaceutical composition of claim 62, wherein the composition further comprises one or more agents selected from the group consisting of a host immune modulator and a second antiviral agent.
- 64. (previously presented) The pharmaceutical composition of claim 63, wherein each of the one or more host immune modulators is selected from the group consisting of interferon-alpha, pegylated-interferon-alpha, interferon-beta, interferon-gamma, a cytokine, and a vaccine optionally comprising an antigen and an adjuvant.
- 65. (previously presented) The pharmaceutical composition of claim 63, wherein the second antiviral agent inhibits replication of HCV by inhibiting host cellular functions associated with viral replication.
- 66. (previously presented) The pharmaceutical composition of claim 63, wherein the second antiviral agent inhibits the replication of HCV by targeting proteins of the viral genome.
- 67. (previously presented) The pharmaceutical composition of claim 62, wherein the composition further comprises an agent or combination of agents that treat or alleviate symptoms of HCV infection.

- 68. (previously presented) The pharmaceutical composition of claim 62, wherein the composition further comprises one or more agents that treat patients for disease caused by hepatitis B (HBV) infection.
- 69. (previously presented) The pharmaceutical composition of claim 68, wherein each of the one or more agents that treat patients for disease caused by hepatitis B (HBV) infection is selected from the group consisting of L-deoxythymidine, adefovir, lamivudine, and tenfovir.
- 70. (previously presented) The pharmaceutical composition of claim 62, wherein the composition further comprises one or more agents that treat patients for disease caused by human immunodeficiency virus (HIV) infection.
- 71. (previously presented) The pharmaceutical composition of claim 70, wherein each of the one or more agents that treat patients for disease caused by human immunodeficiency virus (HIV) infection is selected from the group consisting of ritonavir, lopinavir, indinavir, nelfinavir, saquinavir, amprenavir, atazanavir, tipranavir, TMC-114, fosamprenavir, zidovudine, lamivudine, didanosine, stavudine, tenofovir, zalcitabine, abacavir, efavirenz, nevirapine, delavirdine, TMC-125, L-870812, S-1360, enfuvirtide (T-20), and T-1249.

72-73. (canceled)

74. (previously presented) A method of treating an infection caused by a hepatitis C virus, wherein the method comprises administering to a patient in need of such treatment a therapeutically effective amount of one or more compounds, salts, stereoisomers, or tautomers recited in claim 57.

75-89. (canceled)

90. (previously presented) A compound, or a pharmaceutically acceptable salt, stereoisomer, or tautomer thereof, wherein:

the compound corresponds in structure to formula (1):

A is a monocyclic or bicyclic ring selected from the group consisting of aryl, cycloalkyl, cycloalkenyl, heteroaryl, and heterocycle;

 R^1 is $R_a R_b N_-$;

R² and R³, together with the carbon atoms to which they are attached, form a five- or six-membered ring selected from the group consisting of aryl, cycloalkyl, heteroaryl, and heterocycle;

 R^4 is selected from the group consisting of alkoxy, arylalkoxy, aryloxy, halo, hydroxy, $R_aR_bN_-$, N_3 -, and R_eS_- , wherein R^4 is substituted with 0, 1, or 2 substituents independently selected from the group consisting of halo, nitro, cyano, -OH, -NH₂, and -COOH;

 R^5 is independently selected at each occurrence from the group consisting of alkenyl, alkoxy, alkyl, alkynyl, aryl, arylalkyl, arylcarbonyl, aryloxy, azidoalkyl, formyl, halo, haloalkyl, halocarbonyl, heteroaryl, heteroarylalkyl, heterocycle, heterocyclealkyl, hydoxyalkyl, cycloalkyl, cyano, cyanoalkyl, nitro, R_aR_bN -, $R_aC(O)$ -, R_aS -, $R_a(O)S$ -, $R_a(O)_2S$ -, R_aR_bN alkyl-, $R_a(O)SN(R_f)$ -, $R_aSO_2N(R_f)$ -, $R_a(O)SN(R_f)$ -, $R_aSO_2N(R_f)$ -, $R_aR_bNSO_2N(R_f)$ -

R_a and R_b, at each occurrence, are independently selected from the group consisting of hydrogen, alkenyl, alkyl, alkylsulfanylalkyl, aryl, arylalkenyl, arylalkyl, cyanoalkyl, cycloalkenyl, cycloalkenyl, cycloalkylalkyl, cycloalkylalkenyl, formylalkyl, haloalkyl, heteroaryl, heteroarylalkenyl, heteroarylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkylcarbonyl, and nitroalkyl;

R_c and R_d, at each occurrence, are independently selected from the group consisting of hydrogen.

-NR_fR_h, -OR_f, -CO(R_f), -SR_f, -SO₂R_f, -C(O)NR_fR_h, -SO₂NR_fR_h, -C(O)OR_f, alkenyl, alkyl, alkynyl, cycloalkyl, cycloalkenyl, cycloalkenylalkyl, aryl, arylalkyl, haloalkyl, heteroaryl, heteroarylalkyl, heterocycle, and heterocycloalkyl, wherein each R_c and R_d is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_f), -(alkyl)(NR_fR_h), -SR_f, -S(O)R_f, -S(O)₂R_f, -OR_f, -N(R_f)(R_h), -C(O)R_f, -C(O)OR_f, -C(O)NR_fR_h, -C(O)N(H)NR_fR_h, -N(R_e)C(O)OR_f, -N(R_e)SO₂NR_fR_h, -N(R_e)C(O)NR_fR_h, -alkylN(R_e)C(O)OR_f, -alkylN(R_e)SO₂NR_fR_h, and -alkylN(R_e)C(O)NR_fR_h;

alternatively, R_c and R_d , together with the nitrogen atom to which they are attached, form a three-to six-membered ring selected from the group consisting of heteroaryl and heterocycle, wherein the heteroaryl and heterocycle are independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_f), -(alkyl)(NR_fR_h), -SR_f, -S(O)R_f, -S(O)₂R_f, -OR_f, -N(R_f)(R_h), -C(O)OR_f, and -C(O)NR_fR_h;

R_e is selected from the group consisting of hydrogen, alkenyl, alkyl, and cycloalkyl;

 R_f and R_h , at each occurrence, are independently selected from the group consisting of hydrogen, alkyl, alkenyl, arylalkyl, cycloalkyl, cycloalkylalkyl, cycloalkenyl, cycloalkenylalkyl, heterocycle, heterocyclealkyl, heteroaryl, and heteroarylalkyl, wherein each R_f , R_g , and R_h is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, cyano, halo, oxo, nitro, aryl, arylalkyl, cycloalkyl, cycloalkenyl, heterocycle, heteroaryl, heteroarylalkyl, -OH, -O(alkyl), -N(H)(alkyl), -N(alkyl), -S(alkyl), -S(O)(alkyl), $-SO_2alkyl$, -alkyl-OH, -alkyl-O-alkyl, -alkylN(H)(alkyl), -alkylN(alkyl), -alkylS(alkyl), -alkylS(O)(alkyl), $-alkylSO_2alkyl$, $-N(H)C(O)NH_2$, -C(O)OH, -C(O)O(alkyl), $-C(O)NH_2$, $-C(O)NH_2$, -C(O)N(alkyl), and -C(O)N(alkyl);

alternatively, R_f and R_h, together with the nitrogen atom to which they are attached, form a three-to seven-membered ring selected from the group consisting of heterocycle and heteroaryl, wherein each of the heterocycle and heteroaryl is independently substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, cyano, halo, oxo, nitro, aryl, arylalkyl, cycloalkyl, cycloalkenyl, heterocycle, heteroaryl, heteroarylalkyl, -OH, -O(alkyl), -NH₂, -N(H)(alkyl), -N(alkyl)₂, -S(alkyl), -S(alkyl), -S(O)(alkyl), -alkyl-OH, -alkyl-O-alkyl, -alkylNH₂, -alkylN(H)(alkyl), -alkylS(alkyl), -alkylS(O)(alkyl), -alkylSO₂alkyl, -alkylN(alkyl)₂, -N(H)C(O)NH₂, -C(O)OH, -C(O)O(alkyl), -C(O)NH₂, -C(O)NH₂, -C(O)N(H)(alkyl), and -C(O)N(alkyl)₂;

R_k is selected from the group consisting of hydrogen, alkenyl, alkyl, aryl, arylalkyl, cyanoalkyl,

cycloalkenyl, cycloalkyl, cycloalkyl, cycloalkylalkyl, formylalkyl, haloalkyl, heteroaryl, heteroarylalkyl, heterocycle, heterocyclealkyl, nitroalkyl, $R_aR_bNalkyl$ -, $R_aOalkyl$ -, $R_aR_bNC(O)$ -, $R_aR_bNC(O)$ -, $R_aR_bNC(O)$ -, R_aSO_2 -, $R_aSalkyl$ -, $R_a(O)$ -, R_aSO_2 alkyl-, R_aSO_2 alkyl-, $R_aOC(O)$ -, $R_aOC(O)$ -, and $R_aC(O)$ -alkyl-, wherein each R_k is substituted with 0, 1, 2, or 3 substituents independently selected from the group consisting of alkyl, alkenyl, alkynyl, oxo, halo, cyano, nitro, haloalkyl, haloalkoxy, aryl, heteroaryl, heterocycle, arylalkyl, heteroarylalkyl, alkoxyalkoxyalkyl, -(alkyl)(OR_c), -(alkyl)(NR_cR_d), -SR_c, -S(O)R_c, -S(O)_2R_c, -OR_c, -N(R_c)(R_d), -C(O)R_c, -C(O)OR_c and -C(O)NR_cR_d; and

n is 0, 1, 2, 3, or 4.

91. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 25, wherein: R⁵ is R_aSO₂N(R_f)alkyl-, and

R_a and R_b, at each occurrence, are independently selected from the group consisting of hydrogen, alkenyl, alkyl, alkylsulfanylalkyl, aryl, arylalkenyl, arylalkyl, cyanoalkyl, cycloalkenyl, cycloalkylalkyl, cycloalkylalkyl, formylalkyl, haloalkyl, heteroaryl, heteroarylalkenyl, heteroarylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkylcarbonyl, and nitroalkyl.

92. (previously presented) The compound, salt, stereoisomer, or tautomer of claim 25, wherein: R¹ is R_aR_bN₋, and

R_a and R_b, at each occurrence, are independently selected from the group consisting of hydrogen, alkenyl, alkyl, alkylsulfanylalkyl, aryl, arylalkenyl, arylalkyl, cyanoalkyl, cycloalkenyl, cycloalkenyl, cycloalkylalkyl, cycloalkylalkyl, formylalkyl, haloalkyl, heteroaryl, heteroarylalkenyl, heteroarylalkyl, heterocycle, heterocyclealkenyl, heterocyclealkyl, hydroxyalkylcarbonyl, and nitroalkyl.

- 93. (previously presented) A method of treating an infection caused by a hepatitis C virus, wherein the method comprises administering to a patient in need of such treatment a therapeutically effective amount of one or more compounds, salts, stereoisomers, or tautomers recited in claim 25.
- 94. (previously presented) A method of treating an infection caused by a hepatitis C virus, wherein the method comprises administering to a patient in need of such treatment a therapeutically effective amount of one or more compounds, salts, stereoisomers, or tautomers recited in claim 30.

- 95. (previously presented) A method of treating an infection caused by a hepatitis C virus, wherein the method comprises administering to a patient in need of such treatment a therapeutically effective amount of one or more compounds, salts, stereoisomers, or tautomers recited in claim 33.
- 96. (previously presented) A method of treating an infection caused by a hepatitis C virus, wherein the method comprises administering to a patient in need of such treatment a therapeutically effective amount of one or more compounds, salts, stereoisomers, or tautomers recited in claim 52.
- 97. (previously presented) A method of treating an infection caused by a hepatitis C virus, wherein the method comprises administering to a patient in need of such treatment a therapeutically effective amount of one or more compounds, salts, stereoisomers, or tautomers recited in claim 90.